

RSV (Respiratory Syncytial Virus)

What is it?

RSV is a virus that usually causes respiratory illness in children under two years of age and adults over age 65 and occurs primarily from November through April. RSV is the most common cause of bronchiolitis (inflammation of the small airways in the lung) and pneumonia in children under 1 year of age in the United States. Almost all children are infected with the virus by their second birthday, but only a small percentage develop severe disease. Symptoms are similar to the common cold, but RSV can progress to pneumonia, so it is important to monitor these symptoms in babies and young toddlers.

Symptoms

The illness typically begins 4 to 6 days after exposure with a runny nose and decreased appetite. Coughing, sneezing, and fever typically develop 1 to 3 days later. In very young infants, irritability, decreased activity, and breathing difficulties may be the only symptoms of infection. Most otherwise healthy infants infected with RSV do not require hospitalization, and in most cases, including among those who need to be hospitalized, full recovery occurs in about 1 to 2 weeks.

How does the virus spread?

RSV is often brought into the home by school-aged children and can be rapidly transmitted to other members of the family. RSV can be spread from coughing or sneezing by an infected person. Droplets can linger briefly in the air, and if someone inhales the particles or the particles contact their nose, mouth, or eye, they can become infected.

Infection can also result from direct and indirect contact from infected persons, such as kissing the face of a child with RSV or if the virus gets on an environmental surface, such as a doorknob, that is then touched by other people. Direct and indirect transmissions of virus usually occur when people touch an infectious secretion and then rub their eyes or nose. RSV can survive on hard surfaces such as tables and crib rails for many hours. RSV typically lives on soft surfaces such as tissues and hands for shorter amounts of time.

People infected with RSV are usually contagious for 3 to 8 days. However, some infants and people with weakened immune systems can be contagious for as long as 4 weeks. Premature infants, children less than 2 years of age with congenital heart or chronic lung disease, adults and children with compromised (weakened) immune systems due to a medical condition or medical treatment are at highest risk for severe disease.

Prevention

Prevention is based in cleanliness. Cover all coughs and sneezes. Teach children to cough into their sleeve/elbow or into a tissue not into their hands. Wash hands frequently with soap and water for at 15-20 seconds. Because the virus can survive on surfaces it is important to keep things clean. Counters and door knobs and other surfaces should be cleaned with disinfectant or just hot soapy water. Avoid sharing cups and eating utensils.

RSV is most common from November to April so it would be wise to keep babies and people with poor immune systems away from crowds. If a school age child becomes ill with cold symptoms, you should explain how germs are spread by droplets and touch and encourage them to avoid holding and kissing any younger children or babies until they are better.

A drug called palivizumab (say "pah-lih-VIH-zu-mahb") or Synagis is available to prevent severe RSV illness in certain infants and children who are at high risk. The drug can help prevent development of serious RSV disease, but it cannot help cure or treat children already suffering from serious RSV disease and it cannot prevent infection with RSV. If your child is at high risk, talk to your healthcare provider to see if palivizumab or Synagis can be used as a preventive measure. Researchers are working to develop RSV vaccines, but none is available yet.

When to see a healthcare provider

Visits to a healthcare provider for an RSV infection are very common. Contact your local health clinic if your child is displaying the following symptoms: wheezing, coughing that wakes up the child, pain when coughing, difficulty breathing (baby's head moves with each breath), high persistent fever, ear pain, multiple episodes of vomiting, irritability, atypical behavior, excessive sleeping, decrease in wet diapers or intake of fluids.

There is no specific treatment other than the care of symptoms, but the physician will determine the best care plan for your child. Your doctor can give advice on how to make people with RSV infection more comfortable and assess whether hospitalization is needed.